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27. NEW RECORDS OF HOLOTHURIANS (ECHINODERMATA: HOLOTHURIA)
FROM ANDAMAN AND NICOBAR ISLANDS

(With two text-figures)

The Andaman and Nicobar Islands spread out in the Bay of Bengal between 6° 45'-13° 45' N and 92° 15'-94° 15' E, have one of the richest coral reef formations with fringing reefs on the eastern side and barrier reefs on the western side. The present communication deals with new records of holothurians from these islands. The coral reefs of Andaman and Nicobar Islands offer ideal habitats for littoral sea cucumbers and other echinoderms. There have been several reports (Theel 1882, Koehler and Vaney 1908, James 1969, 1983 and Shastry 1998) on the echinoderms from these islands.

During a coral reef survey of the Mahatma Gandhi Marine National Park, Wandoor (South Andaman), by night and day SCUBA diving, interesting species were collected. The holothurians were preserved in 10% formalin, identified with the aid of keys formulated by James (1969) and Kulkarni (1996). For examining spicules, tissues from different parts of the body were cut and dissolved in a concentrated solution of potassium hydroxide. The spicules were then observed under a microscope and drawn to scale.

Two species of holothurians are recorded for the first time from the Islands. The characteristics of these species are given below.

FAMILY: Stichopodidae Hackel, 1896

GENUS: *Thelenota* Clark 1921

Thelenota ananas (Jaeger, 1833)

Material: Twins Is., 12 m, Rutland Is. 7 m, Boat Is. 9 m depth.

Description: Tentacles 20, length 300 to

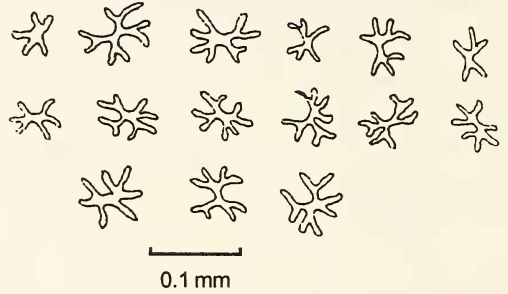


Fig. 1: Spicules of *Thelenota ananas*

425 mm and width ranging from 100 mm to 150 mm. Dorsal and ventral sides well differentiated. Ventral pedicles arranged irregularly. Shape of body sub-rectangular and elongated, characterized with numerous pointed papillae, which are large, conically compressed with their bases united, giving a semistar-like appearance all over the body. Mouth surrounded by 18 to 24 tentacles, papillae. Dorsal papillae double and united at the base to give a star-like appearance. Ventral pedicles arranged irregularly. Live specimens light maroon in colour with an interstitial black zone between the papillae. Spicules (Fig. 1) consist of simple and dichotomously branched rods. Some rods smooth and curved.

Habitat: Sandy bottom and coral rubble.

FAMILY: Synaptidae Burmeister, 1837

GENUS: *Euapta* Ostergren, 1898

Euapta godeffroyi Semper, 1898

Material: Grub Is. 6 m, Jolly Bouys Is. 14 m depth.

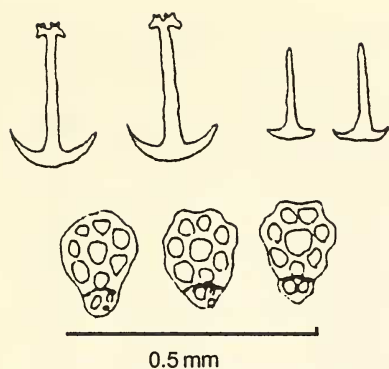


Fig. 2: Spicules of *Euapta godeffroyi*

Description: Length of live specimen 1.75 m, 40 cm when contracted. Body is soft, sticky flexible and highly extensible. 18 pinnule tentacles with digits united by a web in each tentacle. Body surface covered with several rows of closely packed white papillae, giving it a striped appearance. Gonads consist of a number of tubules.

Pale brown in colour with large dark brown bands, equally spaced across the dorsal side. Ventral side pale brown. Spicules present as anchors and anchor plates. Anchor plates narrow

at posterior end, more or less circular with about 7 large holes and 3 small holes at the handle side. There is an identical bridge near the handle for the attachment of the anchor. Anchors small, on the vertex of the anchor are two dents. Flukes of the anchor smooth and of equal size (Fig. 2).

Habitat: Sea grass beds, coral boulders.

ACKNOWLEDGEMENT

We sincerely thank S.K. Mukherjee, Director, Wildlife Institute of India for extending support and facilities.

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28. NEW RECORD OF *MACROBRACHIUM DAYANUM* HENDERSON, 1893 FROM A FRESHWATER ECOSYSTEM OF TRIPURA, INDIA

(With one plate)

Studies on prawns are important from an aquaculture view point (Thakur *et al.* 1994, ASFA 1998). Knowledge of their ecological niche conditions is also needed to clearly record